The Growing Pains of Integrated Health Care for the Elderly: Lessons from the Expansion of PACE

DIANE L. GROSS, HELENA TEMKIN-GREENER, STEPHEN KUNITZ, and DANA B. MUKAMEL

University of Rochester; University of California at Irvine

The early success of the demonstration Program of All-Inclusive Care for the Elderly (PACE) led to its designation as a permanent Medicare program in 1997. But the growth in the number of programs and enrollment has lagged and does not meet expectations. This article offers insights into the mechanisms influencing the expansion of PACE, from information obtained in interviews and surveys of administrators, medical directors, and financial officers in 27 PACE programs. Sixteen barriers to expansion were found, including competition, PACE model characteristics, poor understanding of the program among referral sources, and a lack of financing for expansion. This experience offers important lessons for providing integrated health care to the frail elderly.

THE EFFECTIVE AND AFFORDABLE MANAGEMENT OF health care for the elderly is becoming increasingly important as the baby-boom generation ages and the number of frail elderly requiring continuing care grows. Researchers and policymakers recognize that the currently fragmented system of health care delivery and financing does not meet these people's needs (Booth et al. 1997; Stone 2000; Weiner and Stevenson 1998). The care for this population should emphasize community-based alternatives to long-term institutional care; better coordination of services, particularly acute and long-term care, which is expected to lead to better patient outcomes; and

Address correspondence to: Dana B. Mukamel, Health Policy Research, 100 Theory, Suite 110, University of California, Irvine, CA 92697-5800 (e-mail: dmukamel@uci.edu).

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recognition of the interconnectedness of housing, social support, and health care.

The projected demographic shift, combined with both the consumer-driven movement toward patient-centered health care and governmental concerns about the spiraling cost of health care, has led to the development of several different models of care. The range of available geriatric health services has now expanded to include adult day care facilities, continuing care retirement communities, assisted living, and more home health services, with a variety of federal and state demonstration programs offering these services in different programmatic and financial arrangements.

Efforts to integrate acute and long-term care delivery and financing at the state level have focused on initiatives to enroll low-income seniors who are eligible for both Medicare and Medicaid in managed care programs. Federal and state governments also want to increase the number of home- and community-based options for geriatric care, in order to address consumer demands for alternatives to nursing home care and also to save money for the government (Weiner and Stevenson 1998).

At the national level, two demonstration programs aim to combine acute and long-term care: the Social Health Maintenance Organization (SHMO) and the Program of All-Inclusive Care for the Elderly (PACE).

The SHMOs offer limited community and nursing home care to Medicare enrollees. To date, their success has been limited, with only four programs currently operating, all still as demonstrations, despite the program's nearly 20-year history. In contrast, PACE has proved to be a viable model for frail elderly individuals and has progressed beyond the demonstration stage. PACE has been successful in integrating acute and long-term care service delivery and financing, in maintaining the ability of its participants to remain in the community, and in providing care at a lower cost compared with traditional fee-for-service care (Chatterji et al. 1998; Eng et al. 1997; Temkin-Greener, Meiners, and Gruenberg 2001; Temkin-Greener and Mukamel 2002; White 1998; Wieland et al. 2000).

The success of PACE as a demonstration led to its designation as a permanent Medicare program under the Balanced Budget Act of 1997 (BBA) and opened the way for its rapid expansion nationwide. Its actual growth, however, was much slower. The BBA had authorized 180 nonprofit PACE programs plus ten for-profit demonstration programs

by early 2004, but only 39 programs serving about 10,000 individuals (and no for-profit demonstrations) were operating by that time. This lack of programs raises questions about the ability of the PACE model to move from what some have called a "boutique" program (Bodenheimer 1999) to a widely available model of care that can meet the needs of the expanding elderly population.

In this article we examine the growth of PACE thus far and the factors that may limit its expansion. We first describe the PACE model and its unique features and then analyze enrollment trends and those program, governmental, and environmental factors that may impede growth. The experience of PACE offers important lessons for the planning and implementation of other federal and state strategies for providing health care to the elderly.

The PACE Model of Care

PACE is a managed care program for frail elderly persons who meet state nursing home certifiability criteria.[1] It receives capitated funding from both Medicare and Medicaid and is responsible for all of its participants' health care needs, from primary to acute to long-term care.[2] The program's objective is to enable individuals to continue living in the community as long as possible. It achieves this objective by offering a comprehensive set of medical, psychosocial, and long-term care services. At the core of the program is adult day care, augmented by home care and meals at home. The combined Medicare/Medicaid funding stream that PACE receives allows it to tailor its services to the needs of each participant and provides incentives to integrate acute and long-term care. This article summarizes PACE's most salient features as they pertain to its potential growth. (For more details about the program, see Eng et al. 1997 and Bodenheimer 1999.)

The Participants and the Care They Receive

To enroll in a PACE program, an individual must be eligible for Medicare, be age 55 or older, be nursing home certifiable by the state, and live within the geographic area served by the program (i.e., the "catchment area" delineated in the program's contract with the enrollee's state). The average PACE enrollee is 80 years old and has an average of 7.9 medical conditions and three activities of daily living (ADLs) limitations.

Approximately half of all PACE enrollees have been diagnosed with dementia (National PACE Association 2002b). Most of the enrollees are eligible for Medicaid (95 percent in 2001: authors' calculation from DataPACE).

Elderly persons or their caregivers learn about the PACE programs in their communities through various means. The area's Agencies on Aging or other state or local clearinghouses for senior services may refer eligible participants, as may hospital or nursing home discharge planners. According to PACE program administrators, word of mouth within the community is the most important source of inquiries from seniors, their families, and friends. Depending on the PACE program's particular agreement with the state, either state representatives determine the individual's PACE eligibility directly or the PACE team determines the enrollee's eligibility and obtains the state's approval. In either case, before they can be enrolled, potential participants are evaluated for their medical and social needs, and a care plan is specifically tailored to their needs.

When they enroll, the participants must give up their prior care relationships and agree to receive all their medical care from the PACE program's primary care physician(s) and nurses at the day center's clinic and from specialists designated by the program. The majority of participants attend the day center several days a week for recreational and rehabilitation therapy, personal and medical care, and meals. Transportation to and from the day center is provided by the PACE program. In addition to the services provided at the day center, the participants may receive services in their homes, including skilled nursing, personal care, and chore services. PACE programs also provide the participants' prescription drugs and coordinate their medical specialists' visits, inpatient and outpatient hospital stays, and transitional and long-term nursing home placements.

Each participant's care plan is created and carried out by an interdisciplinary team that includes at least a primary care physician, a nurse, a social worker, physical and occupational therapists, a recreation therapist, and health aides and may also include a pharmacist, a nutritionist, a psychiatrist, a transportation coordinator, and others as needed. The team meets regularly to discuss the participant's status and revise the care plan as his or her needs change. The combination of the staff's frequent contact with the patients in various settings and integrated (rather than fragmented) care delivery and financing helps the PACE model monitor

chronic conditions, thereby preventing hospitalization and supporting the ability of frail elderly to avoid institutionalization as long as possible.

Program Governance and Financing

The first PACE programs received significant start-up funding from national foundations, such as the Hartford and the Robert Wood Johnson Foundations, allowing many of them to be freestanding, independent programs. Once this early demonstration period ended, the large grants from national foundations for start-up costs were no longer available, and as a result, most of the newer programs have been established by existing health care organizations, such as hospitals, health care systems, or long-term care systems that were able to make the necessary initial investment. The parent, or sponsoring, organization, plays a crucial role in the functioning of PACE programs. During its first years of operation, a PACE program may be subsidized by its sponsor when its enrollment is too low for revenues to cover expenses, thereby allowing the program to stay afloat while growing to a breakeven point. (Typically, a PACE program breaks even when it enrolls about 100 participants. Because enrollment tends to average fewer than ten persons per month and because mortality rates for this population are high, programs may take several years to reach the breakeven point.) A sponsored program may benefit from the availability of resources at the parent organization, such as access to a pool of home aides or drivers employed by the sponsor, marketing expertise, and name recognition if the sponsor has a good reputation in the community. But the parent organization may also limit the authority of the PACE program's administrators to make independent decisions, limit their ability to purchase supplies or hire employees in the open market, and require that profits be returned to the sponsor rather then be spent at the discretion of PACE management. Most important, the welfare of the PACE organization may be closely linked to the welfare of the sponsoring organization.

Most programs begin operating with only Medicaid payments being capitated, during which time they are termed pre-PACE. A program becomes a PACE provider when the Centers for Medicare & Medicaid Services (CMS) approves it to receive Medicare capitation rather than fee-for-service reimbursement. Although this difference in financing may affect the program's ability to align its clinical and financial incentives, both pre-PACE and PACE programs have almost identical enrollee

eligibility criteria and provide similar benefits. Furthermore, because pre-PACE programs eventually become PACE providers and because almost all PACE programs begin as pre-PACE, for our purposes, the distinction between them is of little consequence. Therefore, in the remainder of this article we refer to both as PACE programs.

Data and Study Design

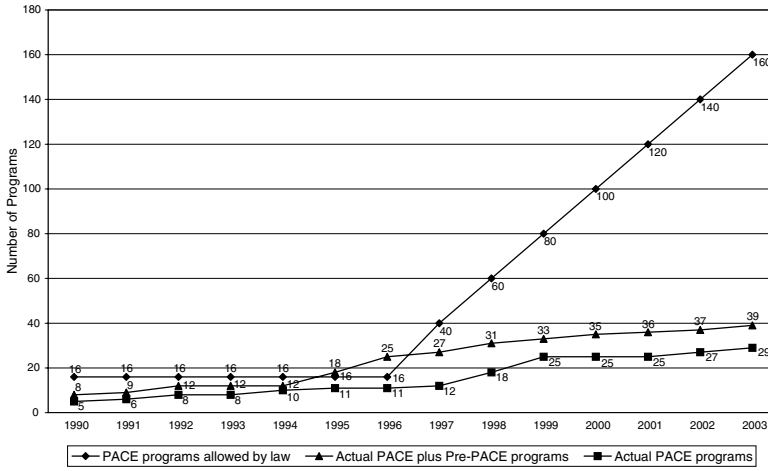
We used three sources of data in our study. First, we compiled enrollment data by program and year from DataPACE, which is an administrative database with information about each PACE participant.[3] Second, between July 2001 and September 2002, we visited 27 PACE programs. During these visits we recorded 113 detailed, semistructured interviews with the program administrators, medical directors, and financial officers. We also conducted, but did not tape, interviews with staff from various disciplines and departments (e.g., social work, nursing, therapies, home care, and transportation) at each program. The interviews addressed the history of the program, its past and current financial status, its political standing with the state and relations with competitors, programmatic issues and their effect on enrollment, participant health and satisfaction, barriers to growth, and other challenges. Third, because our interviews identified 16 different barriers to growth, we conducted a follow-up survey, using a five-point Likert scale, to determine the PACE administrators' perceptions of the relative importance of each of these barriers.

Growth of PACE

By establishing more programs and expanding the existing programs, the total enrollment in PACE grew from fewer than 300 enrollees in 1987 to almost 10,000 by the end of 2002 (National PACE Association 2003).

Growth in the Number of PACE Programs

Because PACE operates under rules and regulations that differ from those of the usual Medicare and Medicaid programs, the number of programs has always been capped by federal legislation. Between 1986 and 1997, PACE had demonstration status, and the number of programs allowed was small. The 1986 Omnibus Budget Reconciliation



Source: Authors' tabulations based on data from the National PACE Association.

FIGURE 1. Replication of PACE Model of Care: Number of Programs by Year, 1990–2003

Act (OBRA) allowed replication of the original model, developed by On Lok Senior Health Services in San Francisco, in only ten sites across the country. The OBRA of 1990 then increased this number to 16. In 1997 PACE became a permanent Medicare program under the BBA. The BBA also capped the number of programs, allowing for a gradual increase—40 upon BBA enactment and 20 more each year afterward.

Figure 1 compares the actual number of PACE programs with the potential number permitted by the federal legislation between 1990 and 2003. The number of PACE programs has never kept up with the legislative caps and, except for two years, neither has the number of PACE and pre-PACE programs combined. The divergence between the potential and the actual has been particularly large in recent years, as the legislative caps continue to allow an additional 20 programs per year, but the actual number of PACE programs has grown by only a few (one to four) each year. By January 2004, the legislation permitted 180 PACE programs, whereas only 29 PACE and ten pre-PACE programs had been established. The BBA also permits up to ten for-profit programs on a demonstration basis, but there still are no for-profit PACE programs anywhere.

Potential Barriers to Growth in Number of Programs

The establishment of new PACE programs requires several elements to be in place: an interested provider willing to undertake the development of a PACE program, a stable and predictable regulatory environment that would allow providers to confidently plan and predict revenues and expenses, enabling state legislation or regulations, and access to financial resources sufficient for the initial investment, risk reserve, and cash flow.

Potential PACE Providers. Although it is difficult to estimate the potential pool of PACE providers, the National PACE Association indicates that currently there are about as many organizations exploring the possibility of becoming a PACE provider as there are PACE programs, that is, around 40 (National PACE Association 2002a). This figure serves only as an indicator, though, because there may be other organizations in the very early planning stages that have not yet asked the National PACE Association (NPA) for technical assistance. It is unclear how many of the interested organizations will choose to become PACE providers. But these numbers indicate that potential providers are cautious and that growth in the near future will continue to be slow.

The Federal Environment. The federal government has generally supported the development of PACE programs, although devising the regulations and payment methodology took several years, creating an uncertain environment. PACE regulations were not promulgated by the U.S. Department of Health and Human Services until two years after the BBA was passed. During this period, potential providers could not establish dually capitated PACE demonstration sites (although they could have started pre-PACE programs if their states had been willing to proceed in the absence of the federal regulations). Furthermore, the BBA included a provision to develop a new, risk-adjusted Medicare payment for managed care providers, including PACE. Because this provision was not made public until 2003, those organizations interested in becoming PACE providers were unable to predict their future revenue stream, adding even more uncertainty to their decision to establish a new PACE program (Temkin-Greener, Meiners, and Gruenberg 2001). This may have been of particular concern to for-profit organizations, whose tolerance for risk may be lower than that of nonprofit programs. Because the planning process to become a PACE provider usually takes one and a half to two

years, it is likely that the small number of programs in place at this time reflects the period of uncertainty following the enactment of the BBA.

The State Environment. Enabling the development of PACE programs as a Medicaid option requires a substantial effort and investment at the state level. States must determine whether new legislation is required, the licensure or certification that providers will need, and whether any financial requirements beyond those stipulated by the federal government will be necessary in view of the state's regulations. The states must pay for any information system modifications needed for claims processing and data reporting, the development of payment rates for PACE and program criteria, clinical oversight and quality assurance activities, and the review and approval of PACE site applications.

The states' efforts to assist the development of PACE programs have varied considerably. Currently, 21 states have at least one operating PACE or pre-PACE program, and additional feasibility studies are under way in seven of those states. A few states (California, Massachusetts, New York, and Pennsylvania) have several programs each, perhaps because of their relatively generous state home- and community-based benefits, as well as their political willingness to adopt innovative social programs. Feasibility studies are also being conducted in ten states without existing PACE operations. The states' interest in PACE programs is likely a response to their struggles to meet the demands of their growing elderly populations, strained Medicaid budgets, and legal challenges (e.g., the 1991 *Olmstead* decision) to the lack of community alternatives to institutional care. However, 19 states have no programs or known feasibility studies. This might be explained by the fact that these states have a much lower population density, averaging 50.9 persons per square mile, compared with an average population density of 255.6 in those states that do have PACE programs. Because the PACE model emphasizes attendance at the day center several times a week for many participants, and because care is provided by the same medical team, usually also located at the day center, the participants' geographic proximity to the PACE site is important. A low population density thus may make it impractical to offer PACE services, for both financial and programmatic reasons.

Funding. Before enrolling patients, the establishment of a PACE program requires significant upfront investment to procure the necessary facilities, set up risk reserves, provide cash flow, and hire staff. Large grants from national foundations accounted for more than 70 percent of start-up funding for the first eight demonstration programs (Kane,

Illston, and Miller 1992). But because PACE is no longer a demonstration, this funding source is no longer available. Grants from local foundations tend to be small and usually are not intended for the investment required for a new PACE site. New programs, therefore, have become increasingly dependent on sponsoring organizations for their initial funding until their enrollment is sufficient to cover operating costs.

Most of the newer PACE programs—those established since the mid-1990s—were sponsored by health systems, hospitals, nursing homes, or other health care organizations (see Table 1). The interest of these organizations in developing PACE programs stems from their efforts to increase their referral pools (e.g., 50 percent of all hospitalizations are of older, frail persons), start new lines of business, and become integrated care providers. Many are religion-based, mission-oriented organizations, like the Alexian Brothers Community Services (Chattanooga, Tennessee), for which the start-up costs were $2,875,170. Most of the funding came from a direct transfer of $2.7 million in interest-free funds from Alexian Brothers Health System, its parent corporation (Green and Gong 2002).

Even though many of these organizations are mission oriented, they do expect their PACE program to eventually become financially self-sustaining. The large initial investment required, coupled with the uncertain revenue environment following the enactment of the BBA, may make it difficult for such organizations to develop a PACE program. The fact that no for-profit organizations have established PACE programs strongly suggests that they are not considered to be a likely profitable venture.

Growth in Enrollment at Existing Programs

The other way for PACE to expand is through the growth of existing programs. At the end of 1992, the ten PACE sites then in existence had an average enrollment of 100. In 2002, ten years later, the average program enrollment was 250.

Not all programs grow at the same rate, nor is the growth rate constant over the life of a program. We found in our interviews with program administrators that in general, even though growth is a goal for most, they face numerous obstacles to increasing their enrollment. When we visited them, 13 of the 27 programs in our study reported that they were not growing.

One might expect growth to be related to a program's age, with the enrollment rapidly increasing as the program starts and leveling off as it reaches a steady state after exhausting the demand in its catchment area. Before it reaches this steady state, one might also expect several periods of growth interrupted by hiatuses if the program's growth is limited by the capacity of the day center. That is, opening a new day center requires long-range planning and money upfront for the construction or renovation of space and the hiring of new staff, which may slow the enrollment. Some of the people we interviewed indicated, though, that rather than treating the available day center capacity as a fixed resource, which might limit growth, they used the number of day care attendance days per enrollee to accommodate the growing enrollment. When the capacity was reached, they then cut back the attendance per participant until a new center was opened.

Our inspection of the growth rates for all PACE programs did not reveal any regular patterns across the sites or interrupted periods of growth. Figure 2 presents two examples of widely different growth patterns. Program 1 grew quickly over a six-year period (1990–1996) followed by two years (1996–1998) of slower growth, possibly because then the program began to exhaust the demand for its services in its catchment area. In 1998 the catchment area for the program was expanded, and enrollment began to pick up, increasing at an even faster rate after 2000. The program administrator noted in the interview that around this time the program began a very aggressive marketing campaign, which may explain the acceleration in growth starting in 2000. By 2002, this program was serving 500 enrollees, twice its size in the mid-1990s and twice the size of the average PACE program. In contrast, program 2 grew very slowly, with protracted periods of stagnation. Its enrollment has not exceeded 100. The differences in growth patterns across programs were a result of different environments, including the local demand for PACE services, state policies, funding issues, limitations imposed by the sponsoring organization, and staffing difficulties.

Next we discuss the most important barriers to growth that we found during our interviews with the PACE management at each site.

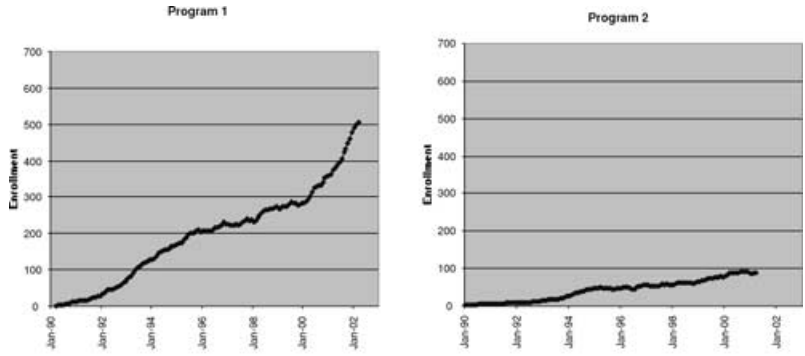
Barriers to Enrollment Growth. In our interviews, the program administrators and staff identified 16 barriers to enrollment growth. To determine the relative importance of these barriers we conducted a follow-up survey, asking the administrators to indicate the importance of each to their program's ability to increase its enrollment during the preceding several years. Table 2 presents the mean importance for each issue

TABLE 1
PACE and Pre-PACE Programs Operating on January 1, 2003

Program Name	State	City	Sponsor	Capitation Dates	
				Medicaid	Medicare
Altamed Senior BuenaCare[a]	CA	Los Angeles	Community Health Ctr.	Jan 96	Nov 98
Center for Elders Independence[a]	CA	Oakland	Freestanding	Sep 92[b]	Apr 95
Sutter SeniorCare[a]	CA	Sacramento	Hospital System	Sep 92	May 94
On Lok Senior Health Services	CA	San Francisco	Freestanding	Nov 83	Nov 83
Total Longterm Care[a]	CO	Denver	Freestanding	Oct 91	Oct 91
Florida PACE Centers, Inc.	FL	Miami	Nursing Home	Jan 03	Jan 03
PACE Hawaii at Maluhia[a]	HI	Honolulu	State Government	May 95[b]	N/A
Chicago REACH[a]	IL	Chicago	Hospital	Apr 95	N/A
Via Christi HOPE	KS	Wichita	Health System	Sep 02	Sep 02
Elder Service Plan—Cambridge[a]	MA	Cambridge	Community Health Ctr.	Apr 95	Dec 98
Elder Service Plan—Harbor Health[a]	MA	Dorchester	Community Health Ctr.	Mar 96	Oct 98
Upham's Elder Service Plan[a]	MA	Dorchester	Community Health Ctr.	Mar 96	Apr 99
Elder Service Plan—East Boston[a]	MA	East Boston	Community Health Ctr.	Jun 90	Jun 90
Elder Service Plan of the North Shore[a]	MA	Lynn	Freestanding	Apr 95	N/A
ESP at Fallon[a]	MA	Worcester	Nonprofit HMO	Mar 95	Nov 98
Hopkins ElderPlus[a]	MD	Baltimore	Hospital	Jan 96	Mar 99
Center for Senior Independence[a]	MI	Detroit	Health System	Apr 95	May 97
Alexian Brothers Community Services	MO	St. Louis	Health System	Oct 00	Oct 00
St. Joseph Senior Care	NM	Albuquerque	Hospital	Feb 98	N/A

Comprehensive Care Management	NY	Bronx	Health System	Feb 92[b]	Feb 92
Total Aging in Place	NY	Buffalo	Senior Health System	Apr 03	N/A
Elant Choice, Inc.	NY	Goshen	LTC System	Nov 00	N/A
Senior Health Partners	NY	New York	Health System	Jun 01	N/A
Independent Living for Seniors[a]	NY	Rochester	Health System	May 92[b]	May 92
Eddy SeniorCare[a]	NY	Schenectady	Health System	Oct 96	May 99
Independent Living Services[a]	NY	Syracuse	Nursing Home	Jan 98	May 99
TriHealth SeniorLink[a]	OH	Cincinnati	Hospitals	Jan 97	May 99
Concordia Care[a]	OH	Cleveland Hts.	Foundation & Hospital	Jan 97	Feb 99
Providence ElderPlace	OR	Portland	Health System	Jun 90	Jun 90
Community LIFE	PA	McKeesport	Health System	Mar 00	N/A
LIFE—University of Pennsylvania[a]	PA	Philadelphia	Univ. School of Nursing	Feb 98	Jan 02
LIFE—St. Agnes[a]	PA	Philadelphia	Hospital	Feb 98	N/A
LIFE—Pittsburgh	PA	Pittsburgh	Health System	Mar 99	N/A
Palmetto Senior Care[a]	SC	Columbia	Hospital	Oct 90	Oct 90
Alexian Brothers Community Services[a]	TN	Chattanooga	Health System	Jan 99	Jan 99
Bienvivir Senior Health Services[a]	TX	El Paso	Freestanding	Feb 92[b]	Jun 94
Sentara Senior Care[a]	VA	Norfolk	Health System	Jul 96	N/A
Providence ElderPlace[a]	WA	Seattle	Health System	Dec 95	Aug 98
Community Care for the Elderly[a]	WI	Milwaukee	Freestanding	Nov 90	Nov 90

[a]Program participated in site visits and survey.
[b]Program operated without capitation before this date.
Source: National PACE Association.



Source: Authors' tabulations based on information from DataPACE.

FIGURE 2. Examples of Variation in Program Growth, 1990–2002

(1 = no importance to 5 = extreme importance), the standard deviation of the responses, and their rank in descending order.

The mean responses ranged from a low of 1.30 for a decline in the program sponsor's reputation to 3.52 for competition with state-funded programs. Most issues scored between 2 and 3, indicating that they were viewed as having some importance. Each of the barriers was "very" or "extremely" important to at least one program's enrollment growth. The standard deviations, ranging from 0.81 to 1.55 and averaging 56 percent of the mean (i.e., average coefficient of variation), suggest substantial variability in the administrators' perception of the importance of each issue. This likely reflects the diversity of environments in which the PACE programs operate.

Our discussion of those issues that were identified as the most important is based on our interviews with the chief executive officers, medical directors, and financial officers of each program, as well as the follow-up administrators' survey. The issues are grouped by category and arranged in order of reported importance. The significance of some of the barriers is not just in their frequency but also in their ability to inhibit growth. State-imposed enrollment caps and sponsors' failure or refusal to finance growth are two such absolute barriers, whose presence can trump or mask the effects of other barriers. In supplemental comments to the survey, two administrators said that because they were experiencing one of these absolute barriers, any other barriers were of little or no importance, even though they likely existed in the program's operating environment. In short, because of absolute barriers, others had little consequence.

TABLE 2
Perceived Barriers to PACE Program Enrollment Growth

Enrollment Barrier	Rank	Mean Score[a]	Standard Deviation	Category
Competition for patients with other state-funded home- and community-based service (HCBS) programs	1	3.52	1.34	Competition
This PACE program operates in a service-rich health care environment	2	2.96	1.29	Competition
Potential participants' unwillingness to change primary care physicians	3 (tie)	2.93	1.00	Program characteristics
Potential participants' unwillingness or inability to meet out-of-pocket cost if not dually eligible	3 (tie)	2.93	1.24	Program characteristics
Gatekeepers' poor understanding of PACE services and eligibility	5	2.56	1.45	Referral/ enrollment processes
Inability to secure external capital funds for expansion	6	2.48	1.55	Financial
Potential participants' unwillingness to attend day care center	7	2.26	.81	Program characteristics
Decline or lack of sponsor investment in facilities needed for growth	8	2.50[b]	1.53	Financial
Inability to increase staffing because of labor shortage	9	2.19	1.50	Staffing
Lack of control over PACE budget surpluses for reinvestment in PACE	10	2.27[b]	1.40	Financial
Enrollment frozen owing to state budget problems	11	2.04	1.51	Government
State concern that growing PACE will accelerate use of Medicaid benefits	12	1.93	1.30	Government
Decline or lack of sponsor investment in PACE outreach or marketing efforts	13	1.96[b]	1.04	Referral/ enrollment processes
Inability to increase staffing because of noncompetitive pay/benefits package	14	1.74	1.29	Staffing
Maximum PACE penetration in service area has been achieved	15	1.48	0.85	Saturation
Decline in sponsor reputation in service area	16	1.30	0.78	Sponsor

[a]Importance ranked on a 5-point Likert scale with 1 = not important and 5 = extremely important.
[b]Mean calculated for sponsored programs only.
Source: Authors' survey of PACE administrators.

Competition. Whether from state-funded home- and community-based programs or a generally rich health care services environment, competition ranked as the most important barrier to growth. Competition from state-sponsored programs was considered to be particularly important, with a mean score of 3.52 and 74 percent of programs reporting it to be of at least "some" importance.

Competing state-operated programs often target the same enrollee population but offer less comprehensive services. Such programs may offer home-based personal care, chore services, and social (nonmedical) day care, but they generally do not offer the primary, acute, and institutional care covered by PACE. These programs have lower costs and thus appear less expensive, but because they do not include the same benefits as PACE, they do not necessarily represent an overall financial savings. Because of this misconception, several PACE administrators view these state-operated programs as receiving preferential treatment with respect to enrollee referrals from state gatekeepers.

Some states also develop competing innovative delivery models for the same frail elderly population. For example, although the Wisconsin Partnership Program operates under the same payment model as PACE does and also uses an interdisciplinary team model of care, it has eliminated both the day center and the requirement to receive service only from the program's physician. The Partnership Program now operates in tandem with PACE in Milwaukee. In Madison, however, after running both programs for two years, management chose to convert its PACE operation to Partnership. Another example is the Massachusetts Health Senior Care Options (MSCO) program. This state demonstration, yet to be implemented, is designed as a community-based alternative for frail, nursing home–certifiable, dually eligible elderly, that is, the same target population as for PACE. Because MSCO's proposed Medicare payment model appears to be significantly more generous than PACE's (University of Maryland Center on Aging 2002), the current six PACE programs in the state (as well as any future PACE providers) will face stiff competition with MSCO.

Competition is not limited to "PACE-like" state-sponsored programs. The availability of services such as social adult day care, home care, and assisted living, all of which became considerably more popular in the past decade, creates service-rich health care markets (importance score 2.96). In these markets, frail individuals may choose only those services that are most important to them without having to "buy" into the entire

PACE model, which may not be attractive to all (this issue is discussed further in the next section). In fact, states like New York, Massachusetts, and California, which have generous home care benefits programs and a history of being willing to adopt innovative programs, also support other programs. Thus, once established, PACE programs in such states may have more difficulty growing than they would if they were the only game in town.

Program Characteristics. Increasing the enrollment of existing PACE programs and opening new programs requires sufficient numbers of interested, eligible elderly within a program's catchment area. The demand for PACE may be limited by features of the PACE model that some people may find unappealing. The least appealing features cited most frequently in our interviews with PACE program directors were consistent with those identified in a 1993 evaluation of PACE: lack of physician choice, out-of-pocket costs, and day center attendance (Branch, Coulam, and Zimmerman 1995).

Because the PACE model of care relies on the interdisciplinary team's close and frequent communication, enrollees must agree to end their relationships with outside care providers. Those people whose relationships with their physicians are very important to them may therefore find this requirement unacceptable. This issue was rated as the third most important barrier to growth, with a mean score of 2.93. Seventy percent of the programs rated this barrier to be of at least some importance. At one PACE program, of the 255 individuals who were referred to the program in 2001 but did not enroll, 42 (16 percent) specifically cited not wanting to change physicians, and another 42 stated more generally that they did not wish to give up their fee-for-service care.

For potential enrollees who are not eligible for Medicaid, the out-of-pocket cost of participation is often prohibitive. This issue had the same importance score (2.93) as the need to change one's primary care physician, with 60 percent of the programs indicating that it was an important barrier. Because Medicare covers only about one-third of the program's cost, enrollees who are not dually eligible must pay the remaining two-thirds themselves, that is, the equivalent of the Medicaid capitation rate. Effective in January 2003, Medicaid capitation rates for PACE ranged from $1,624 to $4,706 per patient per month, with the median at $2,841 (National PACE Association 2003). These high out-of-pocket expenses make it difficult to expand participation in PACE to the middle-class market (those not eligible for Medicaid), as evident in

the fact that only about 5 percent of the PACE enrollees are not Medicaid enrollees.

Also of concern but of less importance (ranking seventh, with a score of 2.26) is the PACE program's emphasis on day care attendance. While frequent day center attendance is an important component of PACE participation for both enrollees (as a site of care provision, observation, and socialization) and caregivers (providing respite), not all enrollees like it. Some consider regular attendance burdensome or otherwise undesirable, despite its medical and social benefits.

Referral and Enrollment Processes. Almost half (48 percent) the PACE programs we studied reported challenges in their relationships with state and local officials important to their referral and enrollment. State or local governments often refer the elderly to appropriate services. Furthermore, PACE enrollees must be certified by the state as requiring nursing home care. Several administrators had to educate state officials in order to correct misconceptions and ensure proper understanding of the benefits of PACE and its suitability to its target population. Because the PACE model is fairly complex, educating state employees requires considerable effort by the PACE program managers and needs to be ongoing, as individual government staff members frequently move in and out of referral-gatekeeping positions. Difficulties in this process ranked as the fifth most important barrier, with a score of 2.56.

In addition to government referral sources, PACE programs' public outreach and marketing use their own and their sponsors' internal resources. Several PACE programs (20 percent) reported that the initial support they received from their sponsors for high-profile marketing and outreach declined over time (ranking it 13th overall, with a score of 1.96). Thus their ability to recruit new participants diminished.

Financing Barriers. As a PACE program's enrollment grows, it eventually faces the space limitations of its existing facilities. Their capacity is restricted by state and local regulations (particularly fire safety codes), and in order to grow beyond a certain point, a program must consider expanding or renovating its facilities, moving to a larger location, or increasing the number of day centers it operates. Securing additional facilities and staffing additional interdisciplinary teams require capital funds. Because PACE programs operate with slim margins, this money generally must come from external sources or a sponsoring organization.

The inability to secure external funding was scored at 2.48 and was ranked as the sixth most important barrier. Administrators of some of the sponsored programs indicated that their sponsor prohibited them from accepting loans or bonds from external sources, a top-down restriction that freestanding programs do not face. (Indeed, freestanding programs rated this barrier considerably less important, at 1.6, than sponsored programs did.) For programs that have a sponsoring organization, an alternative to external support is financing by the sponsor. A decline in or lack of a sponsor's financial support was scored at 2.50 and ranked eighth in importance. Furthermore, PACE programs that are part of larger organizations may not have control over their budget and may be required to funnel surpluses to the sponsoring organization (reported as important by 25 percent of programs, with a score of 2.27). Such programs are not free to use their operational surpluses to invest in growth. This issue was ranked as tenth in importance.

Staffing Shortages. In our interviews, many program administrators reported that local labor shortages, particularly in nursing and therapies, made it difficult to fill some care positions even when they had the funds to increase their staff. One-third of the programs rated labor shortage as an important barrier to growth. This issue ranked ninth, and the importance score was 2.19.

One of the hallmarks of the PACE model is the close and frequent contact between the PACE care team and the participants. There are, however, practical limits to the number of enrollees for whom any single team can care. The generally accepted upper limit range for a single PACE team is 120 to 150 enrollees (also see Eng et al. 1997). Therefore, when enrollment reaches a certain level, adding staff piecemeal to a team may no longer be a viable strategy, and new teams must be created. This creates an even greater hiring challenge.

The administrators and staff at several programs told us that for nurses working in the day center, the environment and the regular hours (daytime shifts, no mandatory overtime, and usually no evening or weekend hours) helped attract and retain nursing staff. But when there was a labor shortage, the ability to offer competitive pay and benefits to prospective and current staff became particularly important. Eighteen percent of programs reported a noncompetitive pay and benefits package to be a very important barrier, although on average it ranked relatively low (14th), with a score of 1.74.

State Government Policies. Two state government policy-related barriers were rated as important to the PACE programs' abilities to increase enrollment: (1) imposed limits on total enrollment (scored at 2.04, ranked 11th) and (2) perceived concerns about increasing Medicaid service use (scored at 1.93, ranked 12th). Because most PACE program funding comes from Medicaid, the economic health of individual states figures prominently in both new program development and existing programs' expansion. State governments may freeze or reduce social programs, including Medicaid, during economic downturns in order to address budget deficits. Such actions can present significant financial challenges for PACE programs (Bloom 2002). During 2001, four PACE programs were operating under state-imposed enrollment caps (under which the state did not make capitated payments beyond a particular number of enrollees) or limits on growth (under which the state continued to pay for increased enrollment but numerically limited the program's net enrollment growth). Thirty percent of the program managers said that budget-related state enrollment caps were an important barrier to growth.

In addition, 30 percent of the program administrators we surveyed perceived state officials to be reluctant to encourage the PACE model for fear of increasing the Medicaid rolls. Net Medicaid savings resulting from PACE can be realized only if the enrollees would otherwise use more costly traditional Medicaid programs. PACE enrollees who would not otherwise use Medicaid services (despite their eligibility for them) cost the state more. According to our interviews with program administrators, this issue of Medicaid-eligible individuals coming "out of the woodwork" to enroll in PACE programs has been raised by a number of government officials.

Market Saturation. We should note that although the administrators we interviewed uniformly supported enrollment growth in principle, they did not expect the programs to continue to grow indefinitely. Administrators at some of the most mature programs believed that their programs were near or had reached market saturation and were likely to grow only by expanding the geographic area they served. In addition to the financing barriers discussed earlier, some programs had already stretched their catchment areas to limits beyond which the population density would be insufficient to yield enough enrollees, or the transportation challenges of bringing participants to the day center would prove to be too great. This barrier was important to four of the original

replication programs and therefore among the oldest. Overall, however, market saturation was not considered very important (ranked 15th of 16 barriers, with a score of 1.48), probably because most of the PACE programs were still relatively young.

Sponsor Reputation. The strength of a sponsor's reputation in the community being served is important to PACE programs. In our interviews, nearly all the sponsored programs' administrators reported that a sponsor's good reputation, in terms of overall name recognition and perception of high-quality care, helped the PACE program's outreach efforts and, ultimately, its enrollment. This was particularly important during the early years, as the program can rely on the name brand of the sponsor while introducing the community and important referral sources to the PACE model of care. Conversely, damage to a sponsor's reputation within the community can hamper a PACE program's enrollment efforts. Though not a widespread problem, a decline in the sponsor's reputation was not inconsequential, as two programs rated this item as having "some" importance for their enrollment, and one program rated it as "very" important.

Discussion

Approximately 3 million elderly in the United States—roughly all community-based, nursing home–certifiable, dually eligible elderly—could benefit from PACE or other integrated care services (Bodenheimer 1999). Despite the size of the current market and its expected growth, attempts at penetrating this market with integrated care options have been limited. PACE currently enrolls only about 10,000 individuals, and no other fully integrated care options have moved beyond the demonstration stage. This raises the question of why growth has been limited and what policies might enhance the market penetration of such programs. The barriers to growth identified in this study and their policy implications, though largely specific to PACE, are likely to be important to other delivery models of integrated care as well.

First, it seems clear that a single model of care and financing is insufficient to meet the variety of specific needs and preferences of this large and growing population. While suitable for a segment of its target population, the PACE model clearly is not an option for all. Just as nursing homes are not appropriate for all elderly, neither should PACE be the only available program for noninstitutional integrated care. Rather, a wider

spectrum of options is needed to accommodate the diverse needs and preferences of the elderly. The appearance of competition and service-rich environment at the top of the list of important barriers, while frustrating for PACE programs trying to grow, may actually encourage the development of a menu of choices in health care programs for the frail elderly, although we do not yet know how well these other programs meet the needs of this population. Programs (such as the Wisconsin Partnership Program) better adapted to less densely populated areas are needed, too, to serve the needs of rural and suburban communities. State strategies for developing home- and community-based geriatric care programs should be multifaceted to increase the ability of the elderly and their caregivers to find the most appropriate match for their care needs and preferences. PACE represents an important, and tested, model of highly integrated care and might be best situated at one end of a range of alternatives to nursing homes.

Second, financing is key to tapping into the non-Medicaid-eligible market. A program like PACE, with two-thirds of its costs paid by Medicaid, is not likely to become very popular with those who are not eligible for Medicaid, because of its high out-of-pocket expense. A few PACE sites have had some limited success in arranging with long-term care insurers to classify PACE as a policy benefit. Over time, the insurance industry's experience in underwriting long-term care risks and managing claims could increase its willingness to pay for integrated care delivery models such as PACE. In the meantime, state governments could encourage private insurers to recognize integrated care programs by providing a favorable public policy environment. For example, states with public/private long-term care insurance partnerships could require that those policies offer PACE and other integrated care benefits.

Third, once integrated care programs are established, communication and coordination among governmental, quasi-governmental, and program staffs are essential to find the best fit between potential enrollees and programs from a number of integrated care options. The common perception of PACE program administrators that gatekeepers in the referral process have a poor understanding of the program suggests that government and program staffs are not automatically good partners without explicit coordinating efforts. With the addition of more integrated care options, the referral and gatekeeping processes must be organized so that the elderly and their caregivers have enough information to choose the most appropriate program for which they are eligible. Continuing training for gatekeepers will be necessary as the menu of options changes.

If only large health systems can afford the start-up costs of developing integrated care alternatives, the number of options is likely to remain quite limited. The creation of a variety of options will be more feasible if the expense of establishing a new program can be spread out to allow other players to participate. The nursing home industry—to which home- and community-based programs like PACE are now meant to serve as alternatives—grew to its current size by the federal government's extraordinary investment in it. Lucrative, low-cost loans offered through the Small Business Association and federal loan insurance from the Federal Housing Administration helped finance the construction of thousands of new nursing homes in the 1950s and 1960s (Brown 2002; Hawes and Phillips 1986; Vladeck 1980). Given the emphasis on the potential cost savings of home- and community-based programs, a similarly large funding effort from the federal government seems unlikely at present. It is equally unrealistic to expect programs providing highly integrated care for elderly people with complex needs, operating with very small margins and under financial risk contracts, to spring up without help from the federal government. Federal initiatives could take the form of developmental funding, federal loan programs, incentives for state-level public/private partnerships under the Medicaid program, and individual tax incentives.

As a model of care serving a vulnerable and costly population with demonstrated efficacy and cost effectiveness, PACE is an important component of a variety of cost-effective long-term care options that offer the elderly and their caregivers access to high-quality care. A critical step in making these options a reality is the creation of legislative and regulatory environments that foster the development of integrated health care delivery programs and the commitment of funds to encourage programs that, like PACE, prove efficacious.

ENDNOTES

1. Medicaid enrollees seeking nursing home care are required to meet health and functional status–related criteria in order to be eligible for state-funded nursing home care. Individuals meeting these criteria are considered "nursing home certifiable." The criteria for nursing home certifiability vary by state.
2. During the initial replication of the On Lok model, great emphasis was placed on using the term *participants* (connoting a holistic and active concept of personhood) instead of the term *patients* (a more passive, medical concept of personhood). But when we visited the sites and conducted our interviews, it was clear that different programs used different terms, depending on the speaker,

the subject, and the context. For example, individuals interested in PACE but not yet enrolled were often called *referrals*. After enrollment, *participant* was widely used in a general context; however, physicians and nurses frequently used the term "patient" when speaking in a medical context, whereas social workers and therapists often used the term *client* when speaking within their disciplinary contexts. *Attendee* was sometimes used when speaking of participants receiving services in the day center (as opposed to receiving services at home). Because this article deals primarily with enrollment in PACE, we use the term *enrollee* in most cases and occasionally *participant* when discussing the experience of individuals in PACE.

3. Until mid-1998 all PACE sites were required by a contract with CMS (formerly the Health Care Financing Administration) to collect and transmit to the CMS data on all participants. When PACE ceased to be a demonstration, CMS no longer required these data, but most PACE sites continue to collect data and contribute to DataPACE. Data for the time period before 1998 are available to the public, whereas those data for the subsequent time period are proprietary and may be obtained only with permission from the sites.

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